September 1998



Office of Air Management

Pollution Prevention

Description

Pollution prevention is a voluntary alternative to regulations for pollution control. The Indiana Industrial Pollution Prevention and Safe Materials Act is designed to shift Indiana's environmental efforts from an emphasis on pollution control to preventing pollution for all sources of pollution throughout the state. Approaches can be applied to all pollution-generating activities, including those found in the energy, agricultural, government, consumer as well as industrial sectors.

Pollution prevention is any practice that reduces the amount of any hazardous substance, pollutant or contaminant released into the environment prior to recycling, treatment, or disposal and practices that reduce or eliminate the creation of pollutants through increased efficiency in the use of raw materials, energy, water or other resources. Also, the risk of exposure for workers and others within industrial processes are decreased and the risk of accidents and environmental harm are reduced. Pollution prevention includes:

- equipment or technology changes,
- process or procedure changes,
- reformulation or redesign of products,
- substitution of raw materials, and
- improvements in housekeeping, maintenance, training, or
- inventory control.

Pollution prevention does not include recycling, energy recovery, treatment, disposal or emission control devices. Some practices commonly described as "in process recycling" may qualify as pollution prevention. However, recycling that is conducted in an environmentally sound manner may reduce the need for treatment or disposal and conserve energy and resources.

Emission Reductions

Agriculture: For farmers, pollution prevention may include reducing the use of water and chemicals, adoption of less environmentally harmful pesticides or cultivation of crop strains with natural resistance to pests, and protection of sensitive areas.

Emission Reduction (cont.)

Energy Generation: Energy generation can reduce environmental damages from extractions processing, transport, and combustion of fuels, including increasing efficiency in energy use, substituting environmentally benign fuels, and design changes that reduce the demand for energy.

Solvent Usage: Degreasing, surface coating, or printing operations present pollution prevention opportunities in raw materials handling and preparation, surface preparation, process, equipment cleaning, and waste management.

Cost Effectiveness

Since pollution prevention prevents waste, transportation and disposal costs are reduced, process efficiency can lead to decreased costs for raw materials, and equipment that prevents pollution can be bought with the costs savings from reduced disposal and raw materials.

Estimated Cost

Pollution prevention saves money on the cost of raw materials and waste disposal.

Implementation Issues

Start up time: Pollution prevention activities can begin immediately.

Public acceptance: Because the program is voluntary, it is supported by industry and the general public.

Funding Sources: Pollution prevention activities save money rather than cost money.

Enforcement: Because the program is voluntary, no enforcement mechanism to assure compliance is required.

Applicability: Pollution prevention can be practiced by everyone.

Comments

To learn more about how you can benefit from pollution prevention, call IDEM's Office of Pollution Prevention and Technical Assistance at (800) 451-6027 press 0 and ask for extension 2-8172 or dial (317) 232-8172 direct.